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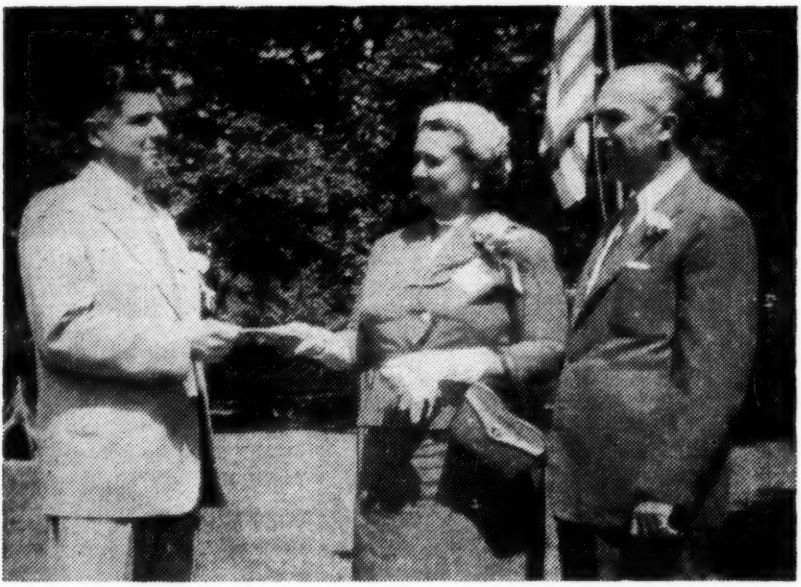
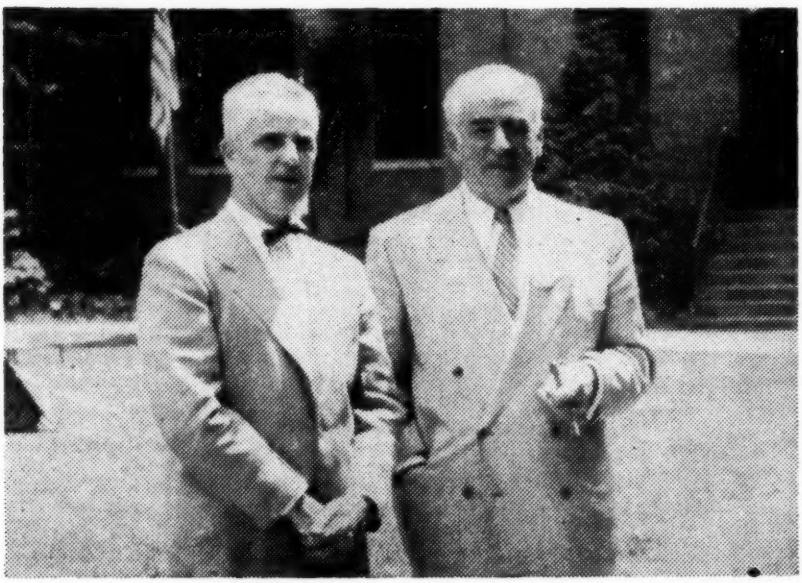


"VINELAND DAY" - 1953. Dr. Walter Jacob receives $3,130 check for research fund from Mrs. Winifred Reinhard, welfare chairman of N. J. Federation of Women's Clubs. Bayard L. England, Member of the Board of Trustees and principal speaker at the program, is at the right.



PARENTS ASSOCIATION. Richard E. Thomson of Newark (left) is the new president of the Parents Association, succeeding Morris Feld of New York pictured beside him. Mr. Feld completed a 3-year term as president this month.

THE COLOR PREFERENCES OF A GROUP OF SUBNORMALS

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The general purpose of this study was to determine the color preference of institutionalized subnormals according to sex and age. A survey of the literature reveals a paucity of data on this subject. Ruesch and Finesigner (3) mention that subnormals prefer brilliant and striking colors, at least, in relation to Rorschach color responses. In color drawings subnormal subjects used red twice as often as other groups.

Investigations of the color preferences of normal children have been carried on more extensively than with subnormals. Winch (5) in 1909, found blue and red in that order were the most preferred colors of normal boys and girls in London schools. In 1924 and 1926, Garth (2) and Dorcus (1) found blue to be the most preferred color among large samples of normal children. Finally, in 1933, Van Nice Gale (4) found orange followed by red-violet to be the most preferred colors of normal boys and girls. Pertinent details of these investigations will be mentioned later when the results of the present study are under discussion.

SUBJECTS* AND METHOD

The subjects were 134 institutionalized subnormal boys and 195 institutionalized subnormal girls. I. Q.'s of the subjects had been obtained by the use of the Revised Stanford-Binet (Form L). All data on age and I. Q. for males and females may be found in Table I.

Each sex group was divided into three chronological age categories, 8-12, 13-15, and 16-18. The Paired Comparison technique was used as the test method. 8″ x 5″ cardboards, neutral gray, were used as backgrounds. Eight colors were used: green, blue, red, orange, violet, yellow, yellow-green, and blue-green. The color patches were made by measuring and cutting eight Hering color discs into eight equal portions, resembling pie-cuts. Each patch measured 1⅞″ across at one end, tapering to ¼″ at the other.

* The authors wish to express their gratitude to Dr. S. W. Bisgrove, Senior Director, Syracuse State School, for his cooperation.

TABLE I

Age in Years and I. Q. Data for Subnormal Males and Females

Age Group	Sex	N	Average C. A.	C. A. Range	Average I. Q.	I. Q. Range
8-12	Male	49	10.8	7.5-12.3	67	53-86
	Female	48	10.9	7.7-12.4	67	44-79
13-15	Male	44	13.8	12.6-15.4	65	52-78
	Female	84	14.2	12.6-15.4	61	46-80
16-18	Male	41	16.9	15.6-18.5	59	48-81
	Female	63	16.5	15.5-18.2	64	48-79

Each color was presented with every other one making a total of 28 stimulus cards. Two different color patches were pasted to every 8" x 5" card with a distance of 1¼" separating the two. To eliminate any systematic bias as to which color on the card would be seen first the cards were turned to the next of the 4 edges after each subject had completed the test. That is, for four consecutive subjects, a color was on the right side of, above, on the left side of, and below the color it was presented with. The cards were always presented in a uniformly random sequence.

The instructions were the same for every subject. The subjects were instructed to point to and name the color they liked better on each card. It was felt that this dual manner of indicating the preferred color would eliminate any color blind subjects. If a subject identified blue as red, for example, that subject was immediately dismissed.

RESULTS AND DISCUSSION

8-12 GROUP: Orange is the first choice of the boys with red following closely behind. Blue is somewhat further behind red. Yellow and yellow-green are tied for fourth choice. Green and blue-green are sixth and seventh with only one preference vote separating the two. Violet is a very poor last. For the females, red is first choice with a substantial lead over blue. Orange trails blue by a safe margin and yellow is closely behind orange in fourth place. Yellow-green and green follow with a scant vote separating the two. Blue-green and violet are far back in seventh and last. The major sex difference is with orange which is first for the males and third for the females. Red, as previously mentioned, is well ahead as first choice for the females.

13-15 GROUP: The males made red their first choice by one preference vote over blue. Orange is a strong third choice with a relatively safe lead over yellow-green. Yellow is fifth with a slim lead over blue-green. Violet and green round out the list. The girls, like the boys, established red as first choice with a one-vote lead over blue. Yellow finished a strong third and orange trailed by a safe margin in fourth. Yellow-green finished fifth, safely behind orange and safely ahead of the next choice. Violet, green, and blue-green complete the list. It may be seen here that red has replaced orange as first choice with the boys. The major sex differences are the greater preference for orange by the males, and the greater preference for yellow by the females. For both sexes, red was first choice by a single vote over blue.

16-18 GROUP: Blue now becomes first choice with the males, holding a slim lead over red. Orange remains a strong third choice. Yellow-green is fourth, a slight choice over yellow. Blue-green, green, and violet finish poorly to round out the group. Blue has also become first choice with the females, but holds a much more substantial lead over second choice red than was found in the male results. Red has a slim lead over yellow which is much more popular among older female subjects than it was for the younger girls. Orange and yellow-green are tied for a poor fourth choice. Green, blue-green, and violet complete the group as usual. As in the previous age group, the major sex differences concern yellow and orange. Yellow is very popular with the girls and orange is not. The reverse is true for the boys. Blue becomes the first choice of both sexes, but, more emphatically so among the females.

ENTIRE GROUP: A survey of the overall results indicates that red and blue are the most preferred colors of the total group of subnormals, irrespective of sex. For both males and females, blue becomes more popular and red less popular as age of the subjects increases, and red gradually loses its advantage over blue until it is surpassed by blue in the oldest age group. The major difference between the sexes in the total picture is the relative importance of yellow and orange. Yellow is more popular with the females, and preference for it increases with age, while orange is a relatively poor fourth choice in two of the three age groups. For the males the situation is reversed. Orange is first choice at the lowest age level and though it slips to third place in the above age groups is it a very strong contender. Only in the 8-12 group among the males is yellow at all a popular choice.

TABLE II

Color Preferences of Subnormal Males and Females Using Paired Comparison Method

(Frequencies Indicate Number of Individual First Choices)

Age Group	N	Sex	1	2	3	4	5	6	7	8
8-12	49	Male	O (20)	R (18)	B (13)	Y (10)	YG (10)	G (7)	BG (6)	V (2)
	48	Female	R (25)	B (15)	O (10)	Y (7)	YG (6)	G (5)	BG (2)	V (1)
13-15	44	Male	R (19)	B (18)	O (15)	YG (10)	Y (7)	BG (5)	V (4)	G (2)
	84	Female	R (38)	B (37)	Y (28)	O (18)	YG (12)	V (6)	G (5)	BG (3)
16-18	41	Male	B (19)	R (17)	O (11)	YG (7)	Y (6)	BG (3)	G (2)	V (2)
	63	Female	B (28)	R (20)	Y (18)	O (7)	YG (7)	G (6)	BG (5)	V (2)

KEY: R—Red Y—Yellow G—Green BG—Blue-Green

B—Blue O—Orange V—Violet YG—Yellow-Green

It may be noted that these results bear out Dorcus' (1) contention that shifting within each half of a color preference sequence is common, while shifting from one half to the other is the exception. For both sexes, at all age levels, red, blue, and orange are among the first four choices and green, blue-green, and violet are among the least preferred quartet. Only yellow and yellow-green fluctuate between fourth and fifth place. Green, blue-green, and violet make very poor showings in every subgroup of the total.

From his work with normal subjects, Winch (5) suggests that a preference for green may be an indication of fairly high mentality. Among our subnormal subjects, the preference for green was a relatively static one which assumed very minor proportions at all age levels. In relation to Winch's idea we may only conclude that the inverse of his suggestion may be true. That is, non-preference for green may possibly be a characteristic of fairly low mentality.

In the same paper, Winch has also suggested that preference for red and yellow over blue and green may be taken to represent relatively primitive color preferences. We have just seen that green is not popular with our group of subnormals. However, both red and blue are highly preferred at all age levels. Yellow is heavily preferred by the girls, especially the older ones. Our results then do not seem to substantiate Winch's hypothesis, except as they relate to green.

If we interpret the results of this study as indicating that red, blue, yellow and orange are the "primary preferences" for subnormals, we are led to some interesting speculation concerning the application of certain projective techniques to subnormals. We might, for example, hypothesize that with the Rorschach cards, subnormal subjects would give a greater volume of projection with cards 2 and 3 than with cards 8, 9, and 10. The reasoning here would be this: although cards 8, 9, and 10 have greater amount and variety of color, cards 2 and 3 would be more stimulating to subnormals because of their evident preference for the color red. There are certain small areas of the last three cards of the series which subnormals would find attractive, but on the whole the colors are too unsaturated and abstract to really attract the subnormal subjects. In the same vein, it might be profitable, when dealing with subnormal subjects, to experiment with the T. A. T. cards made up in some part of the most preferred colors.

From the practical standpoint, the above results might be applied with profit in both academic and vocational classes in institutions for the subnormal. For example, with the younger subjects, making their play materials of their most preferred colors might well make those materials more enjoyable for the children. Similarly, in the older female sewing classes, the girls might find more interest and enjoyment working with materials made of the colors they like. At the very least, teachers should find it worthwhile to experiment with the idea of introducing certain most preferred colors into the classroom situation.

SUMMARY

A color preference test was constructed and administered to 134 subnormal boys and 195 subnormal girls at a State School. The subjects, whose I. Q.'s had been determined by use of the Revised Stanford-Binet (Form L), were divided into three chronological age categories, 8-12, 13-15, and 16-18. The Paired Comparison technique was the method employed and the following eight colors were used: red, green, blue, orange, yellow, blue-green, violet, and yellow-green.

For the males, orange was most preferred by the 8-12 age group, red by the 13-15 age group, and blue by the 16-18 age group. For the females, red was most popular in the 8-12 and 13-15 age groups, and blue was most popular in the 16-18 age group. Generally, red and blue are most popular. As the age of the subjects of both sexes increases, preference for blue becomes stronger and blue becomes first choice over red for the oldest subnormals. The boys consistently give orange a higher rating than do the girls, while the girls consistently give yellow a higher rating than do the boys. Blue-green, violet, and green are, in every subgroup, the least preferred of all colors presented.

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A NOTE ON EXOGENOUS FACTORS IN THE CASE HISTORIES OF MONGOLOID INDIVIDUALS

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One of the important aspects of the study of mental deficiency is the question of etiology. It has long been recognized that etiology has definite implications for the education and well being of the mentally deficient child. For many years mongoloids have been recognized as a clinical group but the problem of etiology is unsettled. Prevailing opinion is that the causative agent occurs *in utero*, (1, 2). Although debate continues as to the cause, it is generally thought that mongoloids are a homogeneous group and they have been treated as such.

In the course of clinical examination and study of histories of the mongoloids at The Training School, it was observed that they frequently had possible exogenous causes of mental deficiency; i. e,. even if they had not been classified as mongoloid, they would qualify for description as exogenous, or non-familial, or organic in etiology. Thus it seemed desirable to look into this question of the presence of other possible etiologic factors in the mongoloids. While such other factors are not to be accepted as definite causes, it is possible that a study of their incidence may throw light on the true etiology of mongolism.

All people classified unquestionably as mongoloids, who were in residence at The Training School in September 1952 were studied. There were 21 boys and 15 girls. Life ages for the boys ranged from 7.9 to 42.7; for the girls from 13.0 to 50.4. Their case histories were abstracted using the data sheet devised for the Riggs-Cassel Classification System (3). The number and type of "Possible Cause" and "Slight Suspicion" of a possible cause for organic damage, as given by the Riggs-Cassel system were tabulated for the females and for the males separately.

Eighteen (86%) of the boys and nine (60%) of the girls had either "Slight Suspicion" or "Definite Evidence" of the presence of one or more organic factors which might cause mental deficiency. Twelve (57%) of the boys and five (33%) of the girls had definite evidence

of the presence of such causative factors. Three boys and five girls had neither definite evidence nor slight suspicion of the presence of etiologic factors in their case histories. The different causes and other pertinent facts are given in Table 1-a and Table 1-b. The following is a list of those items of "Definite Evidence" and "Slight Suspicion" coded in the tables.

DEFINITE EVIDENCE

I—Diagnosis by a neurologist or endocrinologist on the basis of objective examination that a recognized organic syndrome is responsible for the child's retardation, e. g. cerebral palsy, megalencephaly, Froelicks, hydrocephalis.

A—Severe falls or injuries to the mother during pregnancy.

E—Less than 5 lbs. birth weight.

G—Labor 30 hours or more.

J—Severe distortion or maceration of head during birth, e. g. severe flattening, blood visible under skin, small fontanelle, dropped on head at birth, etc.

K—Deficient animation at birth without normal activity occurring immediately thereafter, e. g. crying, breathing.

L—Breach birth, cord around neck, pressure on prolapsed fetal cord.

Q—Meningitis or encephalitis diagnosed at the time of illness, according to report.

S—Whooping cough at 2.5 years, or younger.

X—Abnormal neurological signs of serious intracranial significance, e. g. Kernig's, Babinski, nystagmus, myostagmus, etc., (not merely hyperactive reflexes).

Y—Staggering gait, tottering walk, incoordination prevents running, etc. indicative of gross locomotor disturbance, *after age four.* (Not merely jerky or incoordinate).

SLIGHT SUSPICION

a—Position of baby abnormal during pregnancy and/or birth.

b—Artificial retardation of birth.

c—Between 20-29 hours of labor.

e—"Instruments used" but no recorded injury.

g—Difficult birth, no instruments used.

h—Deficient animation.

n—Slight motor paralysis.

r—Strabismus plus locomotor incoordination.

s—Epilepsy or seizures reported without elaboration.

TABLE I-a

Summary of Information on the Cases Used

Subject Boys	B. D.	I. Q.	Date Given	Definite Evidence	Slight Suspicion	Age of Mother	Birth Order	No. of Sibs
1	3/27	38	6/51	None	None	38	1	0
2	9/37	37	8/51	None	a. b.	45	4	3
3	8/36	34	2/52	None	None	35	3	2
4	11/33	40	10/52	L.	h.	23	1	2
5	6/45	40	12/52	K.	None	38	1	0
6	3/26	22	3/52	E. K.	None	40	2	1
7	11/26	43	12/52	K.	None	31	3	2
8	11/20	46	5/51	None	s.	35	1	0
9	3/29	38	10/51	K. Y.	None	26	2	1
10	3/19	50	10/52	A.	r.	36	4	3
11	9/36	36	10/51	None	None	35	4	3
12	4/21	65	10/51	None	h.	21	2	3
13	3/28	32	7/51	L.	None	23	1	0
14	10/28	37	4/51	K. S.	c.	27	3	2
15	5/16	39	5/46	Q.	s.	26	1	0
16	11/20	40	12/51	None	g.	27	1	1
17	7/10	34	2/52	X.	None	40	3	1
18	6/12	20	2/52	Y.	h.	35	9	8
19	4/26	67	5/52	X.	r.	39	3	2
20	1/24	43	5/51	None	n.	43	3	2
21	1/21	30	12/42	None	h.	38	2	1

TABLE I-b

Summary of Information on the Cases Used

Subject Girls	B. D.	I. Q.	Date Given	Definite Evidence	Slight Suspicion	Age of Mother	Birth Order	No. of Sibs
1	12/29	36	9/52	None	None	20	1	1
2	11/31	35	11/52	None	e.	37	5	4
3	3/39	32	10/52	None	s.	26	2	2
4	3/27	38	10/52	None	None	36	5	4
5	10/02	30	4/47	S.	g.	42	5	?
6	4/08	12	3/47	I. K. L.	None	50	2	1
7	3/03	34	10/47	None	None	39	3	2
8	1/16	37	12/51	None	h.	34	3	3
9	4/11	22	7/47	G. I.	None	40	9	8
10	11/19	41	11/51	None	h.	41	5	4
11	11/28	16	7/51	A. E. K. J. Y.	None	32	4	3
12	11/05	34	9/47	None	None	42	6	4
13	4/24	40	10/49	None	None	?	3	2
14	1/12	26	12/51	X.	None	35	2	0
15	7/14	29	2/52	None	None	26	3	2

These results indicate that mongoloids are not to be considered as a homogeneous group free from those organic pathologies or conditions which are of etiologic significance in other types of defective children. This idea that mongoloids are not a homogeneous group is not entirely new. Tredgold doubted the existence of a mongoloid type. Benda in his discussion of the theories of mongolism cites as one of the theories (1, p. 69) ... "the mental deficiency is dependent upon the same factors as those which produce the malformation of the skull and the general growth disorder. In this case mongolism would not be a primary mental deficiency, but a mental defect secondary to extrinsic agents acting upon the brain." But Benda (1) himself appears to feel that although there are varying degrees of malformation and damage in the mongoloid the group is to be treated as homogeneous. Engler (2) too, in his theory of mongolism recognizes differences in cause but the outcome is a homogeneous group; as he calls it "mongolian idiocy".

The data given in this paper seem to substantiate the thoughts of Tredgold that mongoloids may exist as a special clinical type but that the majority suffer from a variety of other pathologies anyone of which might itself have produced mental deficiency. Further study will be needed before the results may be considered conclusive and it will be necessary, also, to find out whether the evidence of these possible causes is not as great in a population of children whose intellectual functions are normal. For example, seven or 19% of the 36 children in this study suffered deficient animation at birth with apparent anoxia; we should know what proportion of "normal" children have also suffered this condition before we can safely impute etiologic significance to the condition in the case of the deficient children. Study of the intellectual and social behavioral patterns of the mongoloids may further clarify the problem. Intensive neurological study is also of primary concern.

If further study in this area proves fruitful, it may have far reaching effects on the training and expectations for mongoloid children. Just as the deficient children with familial and exogenous etiology need different types of treatment and training to better reach their true capacities, so might this hold true for the mongoloid children. Only further study of this problem will answer these questions.

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NEW SCHOOL NEWSPAPER

The second issue of "The Monthly Gazette", a newly organized mimeographed newspaper published by the school division of the Education Department was distributed in June. The project is under the direction of Dr. Harold A. Delp, coordinator of educational activities.

The 33 reporters and staff editors among the children are supervised by five faculty advisers: Russell Looker, Jay Johnston, Mary Louise Stevens, Margaret Dorosavage, and Jeanne McCloskey.

Items on school activities, sports and recreation programs, clubs, hobbies, Scouting, as well as cartoons and short features are used in the 9-page paper.

The newspaper was developed as a training aid in various classes since it involves many activities . . . writing, English, composition, numbers, drawing, and rudiments of printing.

ATTEND AIR SHOW

On May 30th, twenty-five boys from The Training School attended the first Cumberland County Air Show at the municipal airport in nearby Millville.

Despite the rainy day they witnessed a series of thrilling maneuvers by military, professional, and amateur personnel and enjoyed a special "treat" at the refreshment stands.

The boys were taken to the airport in private cars under the supervision of Bert W. Schmickel, Russell Looker, and Joseph Dunfee.

TRAINING SCHOOL RECEIVES $20,000 GRANT FOR RESEARCH

A research grant of approximately $20,000 to The Training School from the National Institute of Mental Health was announced by Dr. Walter Jacob, director of the school, on "Annual Day", Wednesday, June 10. The NIMH is a branch of the U. S. Public Health Service and is authorized by the Mental Health Act of 1945 to make grants for furtherance of research projects in this field.

The Training School project which has received support from NIMH was set up by Dr. Karl F. Heiser, Coordinator of Research, and Dr. Margaret M. Riggs who will give major supervision to the project during the next two years. This year's grant amounts to $9,600 and an additional $10,300 is earmarked for next year's work.

The research project, which is now underway, is concerned with patterns and stages of intellectual growth. Dr. Riggs will be assisted in her studies by a staff psychologist, a social worker, a research assistant, and a statistical clerk-typist. Dr. Heiser will provide consultation and general administrative supervision.

Funds from The Training School itself in contributions of staff personnel, housing, and supplies needed for the project will amount to about $12,000 Dr. Jacob said.

"We feel that all physical, mental, and psychological disorders with which we deal here have public health significance", Dr. Jacob said. "Therefore, research leading to a better understanding of these problems has definite public value. We are indeed proud that we have been able to meet the required qualifications in bringing this special grant from the U. S. Public Health Service to The Training School."

Dr. Jacob also announced that The Training School is now offering out-patient clinical services, on a limited basis, for children who are brought to the school for diagnosis of suspected mental retardation. Dr. Karl F. Heiser is in charge of this present half-day-a-week service.

Members of the entire professional staff of the school—psychiatric, psychological, medical, educational—are available for this out-patient work. In addition, an electro-encephalograph has been installed in The Training School hospital. Dr. Herman Arbitman, a trained encephalographer and a member of the school's research staff, is in charge of this work. The apparatus which measures and records brain "waves" is useful in diagnosing various types of brain damage and other brain disorders.

DANIEL F. GRAHAM IS NEW SUPERINTENDENT

Daniel F. Graham, who succeeded C. Emerson (Ted) Nash as superintendent of The Training School following the latter's death on March 24, was officially presented to the school's Association membership at the "Annual Day" program on June 10.

DANIEL F. GRAHAM

Pearl S. Buck, noted novelist and a trustee of The Training School, presided at the program. Both she and Dr. Walter Jacob, director of the school, prior to introducing Mr. Graham, paid high tribute to Mr. Nash who had served on the staff since 1898 and had been superintendent for the past 30 years.

Mr. Graham joined The Training School staff as assistant superintendent in the summer of 1951 with 20 years' experience in administration and school supervision.

Born in Pittsburgh, Penna., he received his early education in Cincinnati, O., public schools. He was graduated from Susquehanna University, Selingsgrove, Penna. in 1931, studied physical education at Springfield College, Springfield, Mass. and received his Master's Degree from the University of Pittsburgh in administration in 1946.

Mr. Graham has had varied experience in elementary and secondary schools as teacher, recreational leader, athletic director, supervisor and elementary principal in Western Pennsylvania since 1930. In 1949 he became the superintendent of the schools at Somers Point, New Jersey, residing in Ocean City.

Mr. Graham is a member of the American Association of School Administrators, the South Jersey Schoolmen's Association, and the American Association on Mental Deficiency. He is a member of the Odd Fellows Lodge, the Vineland Kiwanis Club, the First Methodist Church of Vineland, and is active in the Cumberland County Boy Scout Council.

With his wife and three daughters, he resides at The Training School.

VINELAND JAYCEES MEET AT SCHOOL

Each year purchases of The Training School and its staff average more than $500,000 in the Vineland area, Dr. Walter Jacob, director of the school, told Vineland Jaycee members at the June dinner of the group of young business men in Maxham Hall on the school grounds.

Funds from the school itself are spent with scores of firms for feed, paints, plumbing supplies, building materials, furniture, insurance, food and meats, clothing and shoes for the children, fuel oil and the like. Staff members, parents, and guests patronize downtown stores, restaurants, hotels, service stations, movie houses and other establishments, Dr. Jacob stated.

"We have more than 5,000 visitors yearly", he said, "and most of them get into downtown Vineland when they are here."

Other expenditures of the school include city taxes, an electric bill of more than $7,000 annually, and other municipal assessments. Dr. Jacob also pointed out that many of the school's 200 employees live "off-grounds" within the Vineland area, paying rent, taxes, and dealing at local stores.

Dr. Jacob was introduced by Robert Hutchison, president of the Vineland Jaycees. Daniel F. Graham, superintendent of the school, also spoke briefly and introduced Training School staff members who were guests. A short business meeting followed the speaking program.

BOOK REVIEW

PSYCHOLOGICAL PROBLEMS IN MENTAL DEFICIENCY
Second Edition. New York: Harper & Brothers, 1953. ($5.00)
Seymour B. Sarason

This is the same as the previous edition published in 1949, except that the present volume contains three new chapters: (1) Interpretation of mental deficiency to parents, (2) The problem of institutionalization, and (3) The problem of professional training.

Since *The Training School Bulletin* did not publish a review of the first edition, this review attempts to cover both editions.

I think this book has made a most valuable contribution to the field of mental deficiency. It fills a need which has existed for many years. By far the majority of books on this subject previously were either heavily medically oriented, or else concerned themselves with one specific problem such as mongolism, cretinism, the genetics of mental deficiency, or the medico-legal aspects of the field. Sarason's book is noteworthy in that it attempts to include and to integrate material from all of these special fields of interest. Despite its title, it varies its approach and is at appropriate times medically, sociologically, educationally and psychologically oriented.

Another important manner in which this book differs from other previous texts in the field is that Dr. Sarason critically evaluates a number of important experiments which have been performed by others. This makes for much more stimulating and thought-provoking reading than does a simple recapitulation of an experiment. It is particularly good for the student because it helps him to develop a critical attitude and discourages him from accepting the conclusions of a study without regard to its methodology.

Although a number of the chapters in the book are excellent, it seems advisable to mention certain outstanding ones. The two chapters called "Problems in Classification" and "Problems in the Diagnosis of Brain Injury" contain a good deal of sound material and call attention to these two problems which have proved such a source of difficulty for workers in the field, and yet have not received, for the most part, such specific attention in most other books. In his two chapters on "Garden-

Variety Deficiency" Dr. Sarason seems uncertain himself as to which positive approach he should take to this type of deficiency; he reviews the literature on the subject well and critically, but comes to no specific conclusions himself beyond presenting his criteria for this classification.

The chapter on psychotherapy is good in that it focuses on the fact that mentally defective children can benefit from psychotherapy. The value of such long and detailed case studies as the one presented on Lottie is of debatable value, however, since Sarason apparently had no theoretical contribution to make, but simply contented himself with a recitation of the details of the case.

The three new chapters in the second edition, mentioned above, are truly worthwhile. They offer many suggestions for the professional person who deals with parents of defective children.

The author's pleas for more adequate research and more experienced workers, as outlined in his last chapter on "The Problem of Professional Training" is an important one. Dr. Sarason is to be congratulated for including such a chapter in his book, although, strictly speaking, it presents material somewhat outside the general scope of the book.

Several specific items in Sarason's book should be noted for various reasons: His treatment of the Schmidt-Kirk controversy over Schmidt's method and results with teaching defective children seems eminently fair, in addition to being rather complete. His concluding statement on the controversy is certainly as unbiased as one could ask for: "It would seem that until all of Schmidt's data are made available for complete rechecking, Kirk's criticisms (and their implications) cannot be considered as having been conclusively demonstrated to be without foundation."

The chapter on cerebral palsy is interesting, and one not usually found in a standard textbook on mental deficiency. His handling of the recent work with glutamic acid is good, too. He criticizes the methodology of many of the experiments in this area, but then states that the findings seem "sufficiently encouraging to warrant further and more controlled studies". His treatment of mongolism differs from most textbooks on mental deficiency which adhere rather firmly to one particular etiology for mongolism. Sarason gives several of the more widely-accepted theories, together with evaluative comments on them.

In his chapter on projective techniques, Dr. Sarason makes a statement which is particularly welcome. He brings out the fact that mentally defective children are not simple retardates without personality problems (or, indeed, as many people think, without personalities), but that they have as many such problems as do the intellectually normal people. This statement also puts the finger on a failing of those who have tried to explain all about a defective individual simply on the basis of an intelligence test score: "... one of the most significant contributions which projective techniques have made to the field of mental deficiency is that some people have been awakened to the fact that the behavior of the defective individual is not explained by pointing to an intelligence test score and that whatever is subsumed under intellectual processes is inextricably related to and affected by attitudinal or subjective factors which have been acquired as a result of earlier life experiences."

The book contains an excellent bibliography of 339 items as well as good author and subject indices.

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